



Welcome to IEEE Xplore®

- ☐ Home
- ☐ What Can I Access?
- ☐ Log-out

Tables of Contents

- ☐ Journals & Magazines
- ☐ Conference Proceedings
- ☐ Standards

Search

- ☐ By Author
- ☐ Basic
- ☐ Advanced
- ☐ CrossRef

Member Services

- ☐ Join IEEE
- ☐ Establish IEEE Web Account
- ☐ Access the IEEE Member Digital Library

IEEE Enterprise

- ☐ Access the IEEE Enterprise File Cabinet

Your search matched **0** of **1124699** documents.

A maximum of **500** results are displayed, **15** to a page, sorted by **Relevance Descending** order.

Refine This Search:

You may refine your search by editing the current search expression or entering a new one in the text box.

Search

☐ Check to search within this result set

Results Key:

JNL = Journal or Magazine **CNF** = Conference **STD** = Standard

Results:

No documents matched your query.



Print Format

[Home](#) | [Log-out](#) | [Journals](#) | [Conference Proceedings](#) | [Standards](#) | [Search by Author](#) | [Basic Search](#) | [Advanced Search](#) | [Join IEEE](#) | [Web Account](#) | [New this week](#) | [OPAC Linking Information](#) | [Your Feedback](#) | [Technical Support](#) | [Email Alerting](#) | [No Robots Please](#) | [Release Notes](#) | [IEEE Online Publications](#) | [Help](#) | [FAQ](#) | [Terms](#) | [Back to Top](#)

Terms used

disk or **disc** or **diskette** **near/8** **write** **near/4** **protect** and **write** **near/4** **protect** **near/8** **failure** or **error** or **fault** an

Sort results by

Display results
☒ [Save results to a Binder](#)
☒ [Search Tips](#)
☐ [Open results in a new window](#)

Results 1 - 20 of 200

Result page: [1](#) [2](#) [3](#) [4](#) [5](#) [6](#) [7](#) [8](#) [9](#) [10](#) [ne](#)


Best 200 shown

1 [Fast detection of communication patterns in distributed executions](#)

Thomas Kunz, Michiel F. H. Seuren

November 1997

Proceedings of the 1997 conference of the Centre for Advanced Studies on

Full text available:  [pdf\(4.21 MB\)](#)


Additional Information: [full citation](#), [abstract](#), [refere](#)

Understanding distributed applications is a tedious and difficult task. Visualizations based on proce of the execution of the application. The visualization tool we use is Poet, an event tracer develop very complex and do not provide the user with the desired overview of the application. In our exp commun ...

2 [Illustrative risks to the public in the use of computer systems and related technology](#)

Peter G. Neumann

January 1996 **ACM SIGSOFT Software Engineering Notes**, Volume 21 Issue 1

Full text available:  [pdf\(2.54 MB\)](#)

Additional Information: [full citation](#)

3 [RAID: high-performance, reliable secondary storage](#)

Peter M. Chen, Edward K. Lee, Garth A. Gibson, Randy H. Katz, David A. Patterson

June 1994

ACM Computing Surveys (CSUR), Volume 26 Issue 2

Full text available:  [pdf\(3.60 MB\)](#)

Additional Information: [full citation](#), [abstract](#), [refere](#)

Disk arrays were proposed in the 1980s as a way to use parallelism between multiple disks to imp lines of most major computer manufacturers. This article gives a comprehensive overview of disk future work. First, the article introduces disk technology and reviews the driving forces that have the tw ...

Keywords: RAID, disk array, parallel I/O, redundancy, storage, striping

4 [Highly available systems for database applications](#)

Won Kim

March 1984

ACM Computing Surveys (CSUR), Volume 16 Issue 1

Full text available:  [pdf\(2.43 MB\)](#)

Additional Information: [full citation](#), [abstract](#), [refere](#)

As users entrust more and more of their applications to computer systems, the need for systems t even greater. This paper presents a survey and analysis of representative architectures and techn systems for database applications. It then proposes a design of a distributed software subsystem l applica ...

5 [Session summaries from the 17th symposium on operating systems principle \(SOSP'99\)](#)

Jay Lepreau, Eric Eide

April 2000 **ACM SIGOPS Operating Systems Review**, Volume 34 Issue 2

6 DISP: Practical, efficient, secure and fault-tolerant distributed data storage

Daniel Ellard, James Megquier

December 2004 **ACM Transactions on Storage (TOS)**, Volume 1 Issue 1

Full text available:  pdf(148.11 KB)

Additional Information: [full citation](#), [abstract](#), [refere](#)

DISP is a practical client-server protocol for the distributed storage of immutable data objects. Unlike to make explicit tradeoffs between total storage space, computational overhead, and guarantees. Applications specify the degree of redundancy with which each item is encoded, what level of integrity items are stored ...

Keywords: Distributed data storage

7 BASE: Using abstraction to improve fault tolerance

Miguel Castro, Rodrigo Rodrigues, Barbara Liskov

August 2003 **ACM Transactions on Computer Systems (TOCS)**, Volume 21 Issue 3

Full text available:  pdf(438.18 KB)

Additional Information: [full citation](#), [abstract](#), [refere](#)


Software errors are a major cause of outages and they are increasingly exploited in malicious attacks. Some software errors but it is expensive to deploy. This paper describes a replication technique, BASE, for fault tolerance and to improve its ability to mask software errors. BASE reduces cost because it enables high availability ...

Keywords: Byzantine fault tolerance, N-version programming, asynchronous systems, proactive recovery

8 Practical byzantine fault tolerance and proactive recovery

Miguel Castro, Barbara Liskov

November 2002 **ACM Transactions on Computer Systems (TOCS)**, Volume 20 Issue 4

Full text available:  pdf(1.63 MB)

Additional Information: [full citation](#), [abstract](#), [refere](#)

Our growing reliance on online services accessible on the Internet demands highly available systems. Bugs, operator mistakes, and malicious attacks are a major cause of service interruptions and the paper describes a new replication algorithm, BFT, that can be used to build highly available systems that implement replication ...

Keywords: Byzantine fault tolerance, asynchronous systems, proactive recovery, state machine replication

9 Reliability and security of RAID storage systems and D2D archives using SATA disk drives

Gordon F. Hughes, Joseph F. Murray

December 2004 **ACM Transactions on Storage (TOS)**, Volume 1 Issue 1

Full text available:  pdf(94.82 KB)

Additional Information: [full citation](#), [abstract](#), [refere](#)

Information storage reliability and security is addressed by using personal computer disk drives in place of these serial ATA (SATA) PC drives is a tradeoff against drive reliability design and demonstration of Fibre Channel drives. This article discusses the tradeoff between SATA which has the advantage of low storage cost ...

Keywords: Disk drive, SATA, SMART, archival storage, failure prediction, secure erase, storage reliability

10 Hive: fault containment for shared-memory multiprocessors

J. Chapin, M. Rosenblum, S. Devine, T. Lahiri, D. Teodosiu, A. Gupta


December 1995 **ACM SIGOPS Operating Systems Review, Proceedings of the fifteenth ACM SIGOPS**

Full text available:  pdf(1.90 MB)

Additional Information: [full citation](#), [references](#), [citing](#)

11 Pilot: an operating system for a personal computer

David D. Redell, Yogen K. Dalal, Thomas R. Horsley, Hugh C. Lauer, William C. Lynch, Paul R. McJones
February 1980 **Communications of the ACM**, Volume 23 Issue 2

Full text available:  [pdf\(1.14 MB\)](#)


Additional Information: [full citation](#), [references](#), [citations](#)

Keywords: file, high-level language, modular programming, network, operating system, personal

12 The HP AutoRAID hierarchical storage system

John Wilkes, Richard Golding, Carl Staelin, Tim Sullivan

February 1996 **ACM Transactions on Computer Systems (TOCS)**, Volume 14 Issue 1

Full text available:  [pdf\(1.82 MB\)](#)

Additional Information: [full citation](#), [abstract](#), [reference](#)

Configuring redundant disk arrays is a black art. To configure an array properly, a system administrator must understand the workload it will support. Incorrect understanding of either, or changes in the workload over time, is a problem: a two-level storage hierarchy implemented inside a single disk-array controller. In the upcoming issue, we provide a ...

Keywords: RAID, disk array, storage hierarchy

13 Distributed operating systems

Andrew S. Tanenbaum, Robbert Van Renesse

December 1985 **ACM Computing Surveys (CSUR)**, Volume 17 Issue 4

Full text available:  [pdf\(5.49 MB\)](#)

Additional Information: [full citation](#), [abstract](#), [reference](#)

Distributed operating systems have many aspects in common with centralized ones, but they also have many differences. In this survey, we discuss distributed operating systems, and especially to current university research about them. After a discussion of how it is distinguished from a computer network, various key design issues are discussed. Then we discuss some detail ...

14 The HP AutoRAID hierarchical storage system

J. Wilkes, R. Golding, C. Staelin, T. Sullivan

December 1995 **ACM SIGOPS Operating Systems Review , Proceedings of the fifteenth ACM SIGOPS**

Full text available:  [pdf\(1.60 MB\)](#)

Additional Information: [full citation](#), [references](#), [citations](#)

15 A Survey of Techniques for Synchronization and Recovery in Decentralized Computer Systems

Walter H. Kohler

June 1981 **ACM Computing Surveys (CSUR)**, Volume 13 Issue 2

Full text available:  [pdf\(3.33 MB\)](#)

Additional Information: [full citation](#), [references](#), [citations](#), [index terms](#)

16 The TickerTAIP parallel RAID architecture

Pei Cao, Swee Boon Lin, Shivakumar Venkataraman, John Wilkes

August 1994 **ACM Transactions on Computer Systems (TOCS)**, Volume 12 Issue 3

Full text available:  [pdf\(2.04 MB\)](#)

Additional Information: [full citation](#), [abstract](#), [reference](#)

Traditional disk arrays have a centralized architecture, with a single controller through which all requests pass. This performance limits the maximum number of disks to which the array can scale. We describe TickerTAIP, a parallel RAID architecture. TickerTAIP distributes controller functions across several loosely coupled processors. The result is better scalability, fault tolerance, and performance.

Keywords: RAID disk array, decentralized parity calculation, disk scheduling, distributed controller

17 Crosshatch disk array for improved reliability and performance

S. W. Ng

Redundant disk array architecture provides fault tolerance against disk drive failures. However, a : must also be controllers for interfacing with the disk drives, cabling for providing data/control path must also be able to tolerate failure in any one of these components. While currently known array the ...

18 Experience Using Multiprocessor Systems—A Status Report

Anita K. Jones, Peter Schwarz

June 1980 **ACM Computing Surveys (CSUR)**, Volume 12 Issue 2

Full text available:  pdf(4.48 MB)

Additional Information: [full citation](#), [references](#), [citations](#), [index terms](#)

19 Fault Tolerant Operating Systems

Peter J. Denning

December 1976 **ACM Computing Surveys (CSUR)**, Volume 8 Issue 4


Full text available:  pdf(2.69 MB)

Additional Information: [full citation](#), [references](#), [citations](#), [index](#)

20 A taxonomy of computer program security flaws

Carl E. Landwehr, Alan R. Bull, John P. McDermott, William S. Choi

September 1994 **ACM Computing Surveys (CSUR)**, Volume 26 Issue 3

Full text available:  pdf(3.81 MB)

Additional Information: [full citation](#), [abstract](#), [refere](#)

An organized record of actual flaws can be useful to computer system designers, programmers, and for computer program security flaws, with an Appendix that documents 50 actual security flaws. The literature, but in widely separated places. For those new to the field of computer security, they provide how they ...

Keywords: error/defect classification, security flaw, taxonomy

Results 1 - 20 of 200

Result page: [1](#) [2](#) [3](#) [4](#) [5](#) [6](#) [7](#) [8](#)

The ACM Portal is published by the Association for Computing Machinery

[Terms of Usage](#) [Privacy Policy](#) [Code of Ethics](#)

Useful downloads:  [Adobe Acrobat](#)  [QuickTime](#)  [Windows](#)